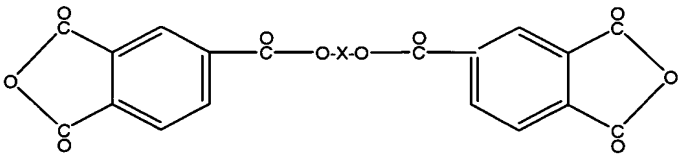
AMENDMENTS TO THE CLAIMS, COMPLETE LISTING OF CLAIMS IN ASCENDING ORDER WITH STATUS INDICATOR

Please amend the following claims as indicated.

1. (Previously Presented) An hard disk drive (HDD) suspension to be obtained by processing a laminate which is constructed of an insulating resin layer and a metal foil successively formed on a stainless steel substrate, said laminate satisfying the following conditions; (1) the insulating resin layer having plural layers of polyimides and every constituent layer of the insulating resin layer exhibits a mean etching rate of 0.5 μm/min or more by a 50% aqueous solution of potassium hydroxide at 80°C, (2) the layers in the insulating resin layer which exist in contact with the stainless steel substrate and the metal foil are those of polyimide (B) exhibiting a glass transition temperature of 300 °C or less, and (3) the adhesive strength between the layer of polyimide (B) and either the stainless steel substrate or the metal foil is 0.5 kN/m or more.

2. (Original) An HDD suspension as described in claim 1 wherein the insulating resin layer of the laminate comprises at least one layer of low-thermal-expansion polyimide (A) exhibiting a coefficient of thermal expansion of 30×10^{-6}/ °C or less.

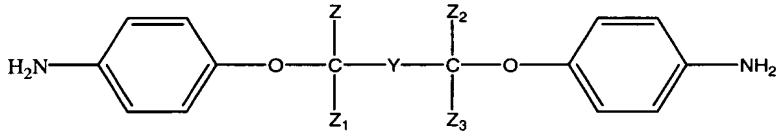
3. (Previously Presented) An HDD suspension as described in claim 1 wherein polyimide (B) constituting the insulating resin layer of the laminate is obtained by the reaction of a diamine and a tetracarboxylic acid dianhydride and 50 mol% or more of said tetracarboxylic acid dianhydride is one kind or two kinds or more of tetracarboxylic acid dianhydrides selected from pyromellitic dianhydride, 3,4,3',4'-benzophenonetetracarboxylic acid dianhydride, 3,4,3',4'-diphenylsulfonetetracarboxylic acid dianhydride and a tetracarboxylic acid dianhydride represented by the following general formula (1)



(1)

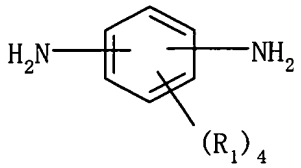
wherein X designates a linear or branched divalent aliphatic hydrocarbon group having 2-30 carbon atoms with or without substituents.

4. (Original) An HDD suspension as described in claim 1 wherein polyimide (B) constituting the insulating resin layer of the laminate is obtained by the reaction of a diamine and a tetracarboxylic acid dianhydride and 50 mol% or more of said diamine is one kind or more of diamines selected from 1,3-bis(3-aminophenoxy)benzene, 3,4'-diaminodiphenyl ether, a diamine represented by the following general formula (2)



(2)

wherein Z, Z_1, Z_2 and Z_3 independently designate a hydrogen atom or an alkyl group with 1-3 carbon atoms and Y designates a linear or branched divalent aliphatic hydrocarbon group having 1-5 carbon atoms with or without substituents; and a diamine represented by the following general formula (3)



(3)

wherein R_1 designates independently hydrogen, an alkyl group with 1-10 carbon atoms, an alkoxy group with 1-10 carbon atoms or a halogen.

5. (Original) An HDD suspension as described in claim 1 wherein processing of the laminate comprises patterning of the insulating resin layer by wet etching as an essential step.

6. (Withdrawn) A process for manufacturing an HDD suspension which comprises utilizing a laminate constructed of an insulating resin layer and a metal foil successively formed on a stainless steel substrate and patterning the insulating resin layer of the laminate by wet etching as an essential step, said laminate satisfying the following conditions; the insulating resin layer has plural layers of polyimides and every constituent layer of the insulating resin layer exhibits a mean etching rate of 0.5μm/min or more by a 50% aqueous solution of potassium hydroxide at 80°C, the layers in the insulating resin layer which exist in contact with

the stainless steel substrate and the metal foil are those of polyimide (B) exhibiting a glass transition temperature of 300 °C or less, and the adhesive strength between the layer of polyimide (B) and either the stainless steel substrate or the metal foil is 0.5 kN/m or more.

7. (Withdrawn) A process for manufacting an HDD suspension as described in claim 6 wherein the patterning by wet etching is performed by the use of a basic fluid exhibiting a pH of 9 or more.

8. (Withdrawn) A process for manufacturing an HDD suspension as described in claim 6 wherein the patterning by wet etching is performed in 2-1,800 seconds.

9. (Withdrawn) A process for manufacturing an HDD suspension as described in claim 6 wherein the patterning of the insulating resin layer by wet etching is performed at 20-100 °C by the use of a basic fluid.

10. (Previously Presented) An HDD suspension as described in claim 2 wherein the low-thermal-expansion polyimide (A) has a thickness of 3-75 μm.

11. (Previously Presented) An HDD suspension as described in claim 2 further comprising a thickness ratio of polyimide (B) to polyimide (A) (thickness of polyimide (B)/thickness of polyimide (A)) in the insulating resin layer of 0.05-1.

12. (Currently Amended) An HDD suspension as described in claim 2 wherein the layer of low-thermal-expansion polyimide (A) comprises an etching rate of 4.0 μm/min or more.

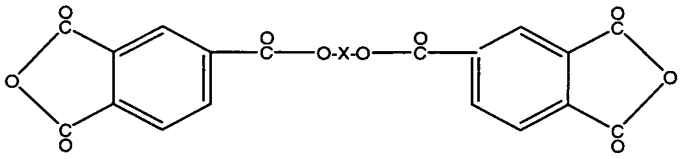
13. (Currently Amended) An HDD suspension as described in claim 1 wherein the layer of polyimide (B) comprises an etching rate of 1.0 μm/min or more.

14. (Previously Presented) An HDD suspension as described in claim 2 wherein a ratio of the etching rate of polyimide (A) to that of polyimide (B) (etching rate of polyimide (A)/etching rate of polyimide (B)) is 2-10.

15. (Currently Amended) An hard disk drive (HDD) suspension to be obtained by processing a laminate which is constructed of an insulating resin layer and a metal foil successively formed on a stainless steel substrate, said laminate satisfying the following conditions; (1) the insulating resin layer having plural layers of polyimides and every constituent layer of the insulating resin layer exhibits a mean etching rate of 0.5 μm/min or more by a 50% aqueous solution of potassium hydroxide at 80°C, (2) the layers in the insulating resin layer which exist in contact with the stainless steel substrate and the metal foil are those of polyimide (B) exhibiting a glass transition temperature of 300 °C or less, and (3) the adhesive strength between the layer of polyimide (B) and either the stainless steel substrate or the metal foil is 0.5 kN/m or more,

wherein the insulating resin layer of the laminate comprises at least one layer of low-thermal-expansion polyimide (A) exhibiting a coefficient of thermal expansion of 30×10^{-6}/ °C or less, and

wherein polyimide (B) constituting the insulating resin layer of the laminate is obtained by the reaction of a diamine and a tetracarboxylic acid dianhydride and 50 mol% or more of said tetracarboxylic acid dianhydride is one kind or two kinds or more of tetracarboxylic acid dianhydrides selected from pyromellitic dianhydride, 3,4,3',4'-benzophenonetetracarboxylic acid dianhydride, 3,4,3',4'-diphenylsulfonetetracarboxylic acid dianhydride and a tetracarboxylic acid dianhydride represented by the following general formula (1)



(1)

wherein X designates a linear or branched divalent aliphatic hydrocarbon group having 2-30 carbon atoms with or without substituents.

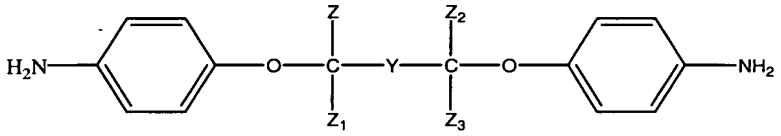
16. (Previously Presented) An HDD suspension as described in claim 15 wherein processing of the laminate comprises patterning of the insulating resin layer by wet etching as an essential step.

17. (Currently Amended) An hard disk drive (HDD) suspension to be obtained by processing a laminate which is constructed of an insulating resin layer and a metal foil

successively formed on a stainless steel substrate, said laminate satisfying the following conditions; (1) the insulating resin layer having plural layers of polyimides and every constituent layer of the insulating resin layer exhibits a mean etching rate of 0.5 μm/min or more by a 50% aqueous solution of potassium hydroxide at 80°C, (2) the layers in the insulating resin layer which exist in contact with the stainless steel substrate and the metal foil are those of polyimide (B) exhibiting a glass transition temperature of 300 °C or less, and (3) the adhesive strength between the layer of polyimide (B) and either the stainless steel substrate or the metal foil is 0.5 kN/m or more,

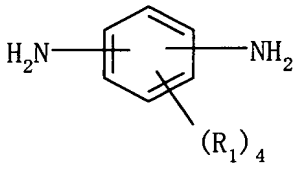
wherein the insulating resin layer of the laminate comprises at least one layer of low-thermal-expansion polyimide (A) exhibiting a coefficient of thermal expansion of 30×10^{-6}/ °C or less, and

wherein polyimide (B) constituting the insulating resin layer of the laminate is obtained by the reaction of a diamine and a tetracarboxylic acid dianhydride and 50 mol% or more of said diamine is one kind or more of diamines selected from 1,3-bis(3-aminophenoxy) benzene, 3,4'-diaminodiphenyl ether, a diamine represented by the following general formula (2)



(2)

wherein Z, Z_1, Z_2 and Z_3 independently designate a hydrogen atom or an alkyl group with 1-3 carbon atoms and Y designates a linear or branched divalent aliphatic hydrocarbon group having 1-5 carbon atoms with or without substituents; and a diamine represented by the following general formula (3)



(3)

wherein R_1 designates independently hydrogen, an alkyl group with 1-10 carbon atoms, an alkoxy group with 1-10 carbon atoms or a halogen.

18. (Previously Presented) An HDD suspension as described in claim 17 wherein processing of the laminate comprises patterning of the insulating resin layer by wet etching as an essential step.

AMENDMENTS TO THE DRAWINGS

The attached sheets of drawings are replacement and annotated sheets for Figure 1.

Attachment: Replacement sheet
Annotated sheet